

ABSTRACT OF THE INVENTION

Recombinant nucleic acid molecules are constructed with a first sequence encoding a transgene under the control of regulatory sequences that direct expression
5 of the transgene product in a hematopoietic stem cell, or a progenitor cell therefrom or cell differentiated therefrom. In one embodiment, the cell which expresses the transgene is a secretory cell. The cell is a megakaryotic progenitor cell, or a cell further differentiated therefrom, such as a platelet. The cell is a
granulocyte/macrophage progenitor cell or a cell further differentiated therefrom, such
10 as a mast cell or neutrophils. Such host cells containing the molecule or the molecule itself are employed in methods for treating or preventing infection, inflammation or vascular injuries or any disorders involving or mediated by cells of the hematopoietic lineage.